

IN THE SPECIFICATION

The manner in which the slicer assembly 14 is gradually indexed upwards and downwards during the slicing operation to provide the desired spiral slicing will ~~no~~ now be described in greater detail with reference to FIG. 8. ~~A more detailed view of the blade rotator sleeve 64 as shown in FIG. 3, reveals that a slot 69 provided therein.~~ A more detailed view of the blade rotator sleeve 64 as shown in FIG. 3 8 reveals that a slot 69 provided therein. Also, in the embodiment shown in FIG.8, a sleeve offset arm 222 may include a torroidal shape slide member 63 circumscribing the outer surface of the rotator sleeve 64 and having a tongue portion 61 extending into the vertically aligned slot 69. In this manner, the rotator sleeve 64 is permitted to move vertically with respect to offset arm 222. However, due to tongue 61 of the torroid member 63 extending into slot 69, upon actuation of the piston within cylinder housing 70, the stroke of cylinder rod 72 may be transmitted through pin 74 to offset arm 222 so as to cause rotation of the rotator sleeve 64 about the linear indexing axis in the desired direction. Therefore, the linear movement of rod 72 is transmitted through pin 74 to the offset arm 222 and converted into torque delivered by the tongue of 61 of the torroidal member 63 to rotator sleeve 64.

To summarize the operation of the present invention, a meat spit is inserted in the meat to be cut and fitted into upper and lower chucks 40 and 28. The meat is then positioned between chucks 28 and 40, with the tee member 402 of spit 400 positioned in slot 300 and the stem member 404, in hole 312. A split nut 242 is fitted over cylinder rod 72 and threaded onto externally threaded nut 240 which is on the face of the cylinder housing 70, thereby limiting the movement of cylinder rod 72 to prevent slicer blade 60 from coming into engagement with meat spit 400. The meat is disposed between chucks 28 and 40 and held by the plurality of spikes located thereon. The meat is then rotated about the chuck assembly axis by means of electrical motor 16 which is in turn controlled by motor controller 152. The slicer assembly 14 and slicer blade 60 are caused to index in a vertical fashion upon energization of motor 96 which in turn drives shaft 66 through sprockets 98, 100 and drive chain 102. The slicer blade is brought into engagement with the meat by energization of pneumatic cylinder 70 through line 142 causing cylinder rod 72 to linearly index and apply torque to blade rotator shaft 64 by means of blade rotator arm 220 and pin 74. The rotation of meat in chuck assembly 11 and the linear indexing of the slicer assembly 14, thereby effect a spiral cut on the meat disposed ~~int he~~ in the chuck assembly 11. The engagement force provided by means of pneumatic cylinder 70 may be overcome readily by means of a handle connected to blade support arm 58. Upon de-energization of the slicer assembly 1 will maintain its relative vertical position prior to de-energization. Slicing operations may be recommenced with the slicer assembly 1 maintaining the same position and reengaging the meat to maintain the same spiral cut.